

## REMARKS

### I. STATUS OF THE CLAIMS

Claims 31-39 and 42-60 are currently pending. Of these, claim 37 is allowed.

### II. REJECTION UNDER 35 USC 112

Claim 31 is amended to recite that the multilayer film stack, having said at least one cycle cut away, corrects a wavefront aberration of a wavefront phase of a light reflected by the multilayer film stack that would have been caused by the error of shape of the substrate if said at least one cycle of alternating layers were not cut away. Therefore, the effect of the "error of shape" of the substrate is more clearly defined in the claims.

Somewhat similar amendments are made to other independent claims.

See, for example, page 5, line 18, through page 7, line 3; page 7, lines 9-19; page 10, lines 20-24; page 11, lines 8-17; page 12, line 4, through page 13, line 16 (see especially page 12, lines 18-22), of the specification.

In view of the above, it is respectfully submitted that the rejection is overcome.

### III. PRIOR ART REJECTIONS

Claim 31 is amended to recite a method comprising: (a) forming, on a substrate having an error of shape, a multilayer film stack of alternating layers of high refractive index material and low refractive index material and that reflects radiation in a range from vacuum ultraviolet through X-ray; and (b) cutting away at least one cycle of alternating layers from a portion of the multilayer film stack so that the multilayer film stack, having said at least one cycle cut away, corrects a wavefront aberration of a wavefront phase of a light reflected by the multilayer film stack that would have been caused by the error of shape of the substrate if said at least one cycle of alternating layers were not cut away.

Somewhat similar amendments are made to other independent claims.

See, for example, page 5, line 18, through page 7, line 3; page 7, lines 9-19; page 10, lines 20-24; page 11, lines 8-17; page 12, line 4, through page 13, line 16 (see especially page 12, lines 18-22), of the specification.

Therefore, as recited, for example, in claim 31, the substrate has an error of shape that would have caused a wavefront aberration of a wavefront phase of a light reflected by the

multilayer film stack. However, as recited, for example, in claim 31, the multilayer film stack, having said at least one cycle cut away, corrects the wavefront aberration.

Itou relates to the repair of a defective portion of a *multi-layer*. More specifically, as shown in FIG. 6(a) of Itou, a defective portion 6 exists on the surface of *multi-layer* 2. Itou removes films of the multi-layer 2 in order to repair the defective portion 6. See, for example, column 5, lines 8-49, of Itou.

Therefore, in Itou, the films of the multi-layer 2 are removed in order to repair defective portion 6 of the multi-layer 2.

Itou does not disclose or suggest that a *substrate* has an error of shape that would cause a wavefront aberration of a wavefront phase of a light reflected by a multilayer film stack formed on the substrate, and that the *multilayer film stack corrects the wavefront aberration*.

Therefore, it is respectfully submitted that Itou does not disclose or suggest the features recited, for example, in the amended claim 31.

The above comments are specifically directed to claim 31. However, it is respectfully submitted that the comments would be helpful in understanding various differences of various other claims over the cited references.

\* \* \*

It is respectfully submitted that all the prior art rejections are overcome for at least the reasons described above.

#### IV. CONCLUSION

In view of the above, it is respectfully submitted that the application is in condition for allowance, and a Notice of Allowance is earnestly solicited.

If there are any additional fees associated with filing of this Amendment, please charge the fees to our Deposit Account No. 19-3935.

Respectfully submitted,  
STAAS & HALSEY LLP

Date:

October 8, 2008

By:

Paul I. Kravetz

Registration No. 35,230

1201 New York Avenue, NW, 7th Floor  
Washington, D.C. 20005  
Telephone: (202) 434-1500  
Facsimile: (202) 434-1501